AMENDMENTS TO THE CLAIMS:

This listing of claims will replace all prior versions, and listings, of claims in the application. Please enter the amendment as indicated below. These amendments introduce no new matter and support for the amendment is replete throughout the specification and claims as originally filed. These amendments are made without prejudice and are not to be construed as abandonment of the previously claimed subject matter, or agreement with any objection or rejection of record.

Listing of Claims:

1. (Currently Amended). A [R]reagent useful for diagnosing attention deficit hyperactivity disorder (ADHD), comprising an isolated polynucleotide comprising a polymorphism in linkage disequilibrium with ~~an allele of DRDR~~ DRD4-7R, wherein the polymorphism is other than an L1 or L2 polymorphism~~associated with individuals exhibiting ADHD~~.

2. (Currently Amended) The reagent of claim 1, wherein the polynucleotide ~~corresponds to~~comprises a polymorphism that ~~is closely linked to a DRD4 7R allele~~exhibits greater linkage disequilibrium with DRD4-7R than DRD4-4R.

3. (Cancelled)

4. (Currently Amended) The reagent of claim [3]1, wherein the ~~locus of the marker~~polymorphism is within ~~100~~2.7 kB of the DRD4 ~~7R allele~~exon 3 variable number tandem repeat (VNTR).

5. (Currently Amended) The reagent of claim [3]1, wherein the ~~locus of the marker~~polymorphism is within ~~50 kB~~350 base pairs from the center of the DRD4 ~~7R allele~~exon 3 variable number tandem repeat (VNTR).

6. (Currently Amended) A [R]reagent useful for diagnosing ADHD, comprising a pair of oligonucleotides ~~corresponding to a locus~~for amplification of a polymorphism in linkage disequilibrium with ~~an allele of DRDR~~DRD4-7R, wherein the polymorphism is other than an L1 or L2 polymorphism~~associated with individuals exhibiting ADHD~~.

7. (Currently Amended) The reagent of claim 6, wherein the polymorphism exhibits greater linkage disequilibrium with DRD4-7R than DRD4-4R~~pair of oligonucleotides corresponds to a locus closely linked to the DRD4 7R allele~~.

8. (Cancelled)

9. (Currently Amended). The reagent of claim [8]6, wherein the ~~locus of the marker~~polymorphism is within ~~100~~2.7 kB of the DRD4 ~~7R allele~~exon 3 variable number tandem repeat (VNTR).

10. (Currently Amended) The reagent of claim [8]6, wherein the ~~locus of the marker~~polymorphism is within ~~50 kB~~350 base pairs from the center of the DRD4 ~~7R allele~~exon 3 variable number tandem repeat (VNTR).

11-14. (Cancelled)

15. (New) The reagent of claim 1, wherein the polynucleotide is an amplicon.

16. (New) A reagent useful for diagnosing ADHD, comprising two or more pairs of isolated oligonucleotides for amplification of two or more polymorphisms in linkage disequilibrium with DRD4-7R.

17. (New) The reagent of claim 16, wherein the two or more polymorphisms are selected from the group consisting of:

an A polymorphism of the A-C SNP pair in DRD4 intron 3;

a C polymorphism of the A-C SNP pair in DRD4 intron 3;

an Ll polymorphism; and

an L2 polymorphism.